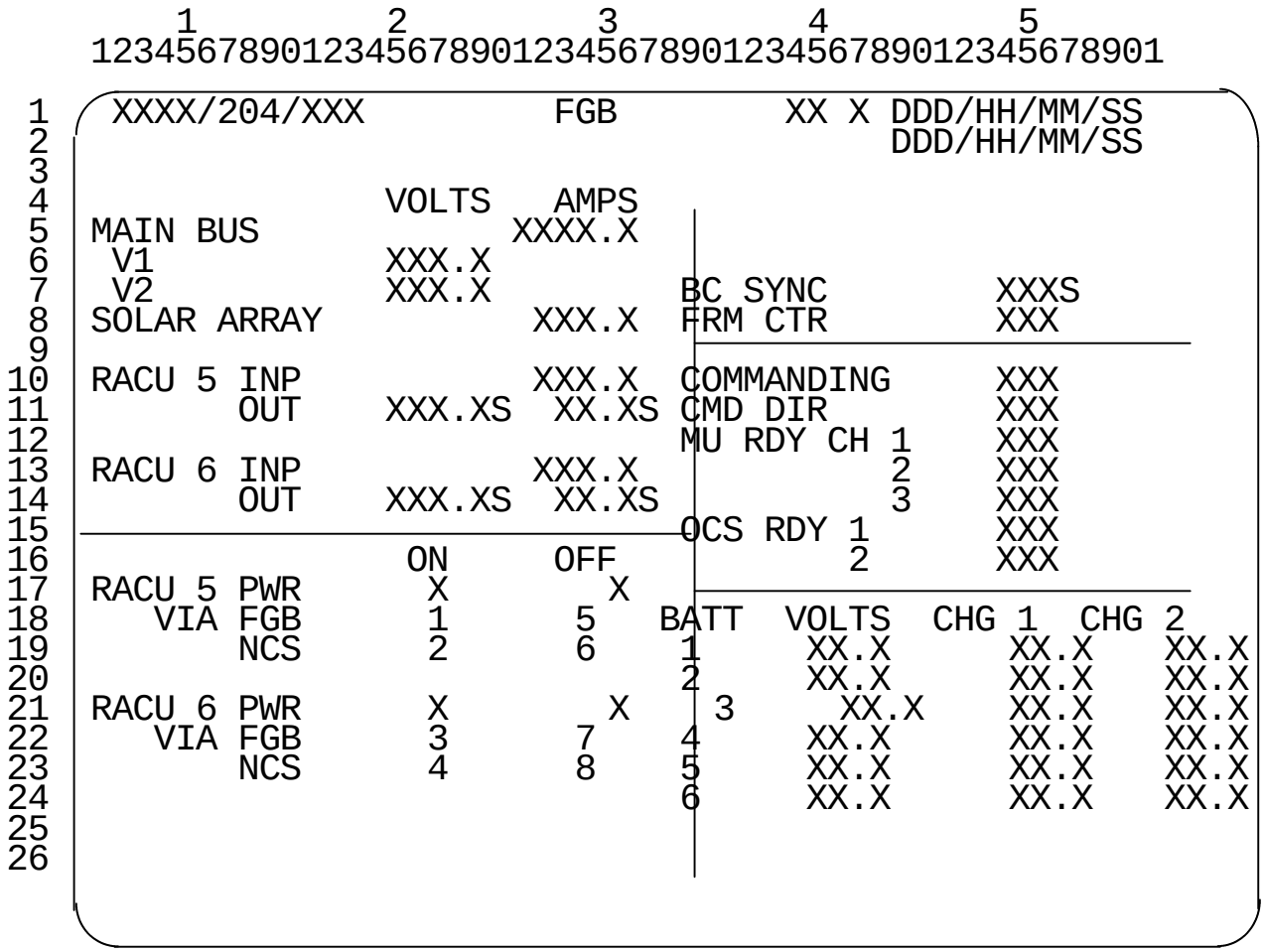
SPEC 204 FGB DISPLAY



PARAMETER CHARACTERISTICS: SM 204 FGB DISPLAY

CRT NAME	MSID	UNITS	DISPLAY RANGE	STATUS INDICATORS					FDA (Limits)	
				M	H	L	↑	↓	HI	LO
MAIN BUS AMPS	P79C0236A	AMP	0 --- 600						N/A	N/A
MAIN BUS V1 VOLTS	P79V0270A	VDC	0 --- 40					↓	N/A	28.5
MAIN BUS V2 VOLTS	P79V0272A	VDC	0 --- 40					↓	N/A	28.5
SOLAR ARRAY AMPS	P79C0510A	AMP	0 --- 600						N/A	N/A
RACU 5 INPUT AMPS	P79C0242A	AMP	0 --- 35						N/A	N/A
RACU 5 OUTPUT VOLTS	P79V0274A	VDC	0 – 150				↑	↓	130V	118V
RACU 5 OUTPUT AMPS	P79C0238A	AMP	0 --- 80				↑		16A	N/A
RACU 6 INPUT AMPS	P79C0244A	AMP	0 --- 35						N/A	N/A
RACU 6 OUTPUT VOLTS	P79V0276A	VDC	0 --- 150				↑	↓	130V	118V
RACU 6 OUTPUT AMPS	P79C0240A	AMP	0 --- 80				↑		16A	N/A
RACU 5 POWER ON	P79X0383E	----------	'*' = 1, blank = 0						---------	---------
RACU 5 POWER OFF		----------	blank = 1, '*' = 0						---------	---------
RACU 6 POWER ON	P79X0384E	----------	'*' = 1, blank = 0						---------	---------
RACU 6 POWER OFF		----------	blank = 1, '*' = 0						---------	---------
BC SYNC [1]	P79X0211E	----------	YES = 0, NO = 1					↓	N/A	1
FRM CTR [2]	P79U0116D	----------	INCREMENT						---------	---------
COMMANDING [3]	P79X0511E	----------	ENA = 1, INH = 0						---------	---------
CMD DIRECTION [4]	P79X0512E	----------	MU = 1, DIO = 0						---------	---------
MU READY CH 1	P79X0513E	----------	YES = 1, NO = 0						---------	---------
MU READY CH 2	P79X0514E	----------	YES = 1, NO = 0						---------	---------

PARAMETER CHARACTERISTICS: SM 204 FGB DISPLAY (Cont)

CRT NAME	MSID	UNITS	DISPLAY RANGE	STATUS INDICATORS					FDA (Limits)	
				M	H	L	↑	↓	HI	LO
MU READY CH 3	P79X0515E	----------	YES = 1, NO = 0						---------	---------
OCS READY 1	P79X0518E	----------	YES = 1, NO = 0						---------	---------
OCS READY 2	P79X0519E	----------	YES = 1, NO = 0						---------	---------
BATT 1 VOLTS [5]	P79V0278A	VDC	0 --- 35					↓	N/A	25.5
BATT 1 CHG 1 [5]	P79E0246A	AMP-HRS	0 --- 60						N/A	N/A
BATT 1 CHG 2 [5]	P79E0248A	AMP-HRS	0 --- 60						N/A	N/A
BATT 2 VOLTS [5]	P79V0280A	VDC	0 --- 35					↓	N/A	25.5
BATT 2 CHG 1 [5]	P79E0250A	AMP-HRS	0 --- 60						N/A	N/A
BATT 2 CHG 2 [5]	P79E0252A	AMP-HRS	0 --- 60						N/A	N/A
BATT 3 VOLTS [5]	P79V0282A	VDC	0 --- 35					↓	N/A	25.5
BATT 3 CHG 1 [5]	P79E0254A	AMP-HRS	0 --- 60						N/A	N/A
BATT 3 CHG 2 [5]	P79E0256A	AMP-HRS	0 --- 60						N/A	N/A
BATT 4 VOLTS [5]	P79V0284A	VDC	0 --- 35					↓	N/A	25.5
BATT 4 CHG 1 [5]	P79E0258A	AMP-HRS	0 --- 60						N/A	N/A
BATT 4 CHG 2 [5]	P79E0260A	AMP-HRS	0 --- 60						N/A	N/A
BATT 5 VOLTS [5]	P79V0286A	VDC	0 --- 35					↓	N/A	25.5
BATT 5 CHG 1 [5]	P79E0262A	AMP-HRS	0 --- 60						N/A	N/A
BATT 5 CHG 2 [5]	P79E0264A	AMP-HRS	0 --- 60						N/A	N/A
BATT 6 VOLTS [5]	P79V0288A	VDC	0 --- 35					↓	N/A	25.5
BATT 6 CHG 1 [5]	P79E0266A	AMP-HRS	0 --- 60						N/A	N/A
BATT 6 CHG 2 [5]	P79E0268A	AMP-HRS	0 --- 60						N/A	N/A

REMARKS

[1] In the BC SYNC field, either 'YES' or 'NO' will be displayed to indicate whether or not the FGB MDM is communicating with the bus controller (either the OIU or Node MDM). When the FGB MDM loses sync with the bus controller, this field will read 'NO' and the crew will receive an alert light, tone and fault message.

[2] By checking to see if the frame counter (FRM CTR) is incrementing, the crew can determine whether data is being received from the FGB MDM.

[3] The COMMANDING field indicates whether or not the relay command matrix has been enabled (ENA) or inhibited (INH). The relay command matrix is controlled by the Mission Control Center in Moscow (**MCC-M**). When this command matrix is enabled, the Mission Control Center in Houston (**MCC-H**) or the crew can command the FGB. This field must read 'ENA' before either **MCC-H** or the crew has the capability to issue the RACU power ON and OFF commands.

[4] The CDM DIR field indicates the direction of a command sent to a FGB element. This field will read either 'MU' to indicate that the command was originated from the Matching Unit or 'DIO' to indicate that the command was originated from the FGB MDM.

[5] The BATT section displays the voltage and two charge readings for the six FGB batteries. The BATT CHG parameters measure the state of charge in Amp-hrs of the batteries. The range is 0 to 60 Amp-hrs, 0 being a completely drained battery and 60 being a fully charged battery. There are two sensors that measure the charge. The Russians are able to select and de-select the sensors depending on their telemetry needs. Therefore, both sets of battery charge data may not be available.

ITEM ENTRY CHARACTERISTICS: SM 204 FGB DISPLAY

Items 1 --- 5: RACU 5 PWR VIA FGB ON/OFF - enables the crew to command RACU 5 power On/Off via the FGB MDM when the OIU is the bus controller. An asterisk will be displayed under the ON/OFF column.

Items 3 --- 7: RACU 6 PWR VIA FGB ON/OFF - enables the crew to command RACU 6 power On/Off via the FGB MDM when the OIU is the bus controller. An asterisk will be displayed under the ON/OFF column.

Items 2 --- 6: RACU 5 PWR VIA NCS ON/OFF - enables the crew to command RACU 5 power On/Off via Node MDM when the Node MDM is the bus controller. An asterisk will be displayed under the ON/OFF column.

Items 4 --- 8: RACU 6 PWR VIA NCS ON/OFF - enables the crew to command RACU 6 power On/Off via Node MDM when the Node MDM is the bus controller. An asterisk will be displayed under the ON/OFF column.